Virginia Saltwater Development Fund
Evaluation of a Proposal for the Development of a Research or Data Collection Project

Project Number: 0409-20 **Date: June 29, 2009**

Title: T) 2010 Connecting Productivity in Eelgrass Beds to Recreationally Important Finfishes in Chesapeake Bay: Forage Fishes as Trophic Conduits

> "The Virginia Saltwater Recreational Fishing Development Fund is to be used solely for the purpose of conserving and enhancing finfish taken by recreational anglers, enforcing laws related to natural resource conservation, improving recreational fishing opportunities, obtaining necessary data and conducting research for fisheries management, and creating or restoring habitat for species taken by recreational fishermen."
>
> Code of Virginia, Section 28.2-302.3

NOTE: Please read the entire scoresheet before beginning, then provide comments, and circle ( ) the appropriate score for each item. Thank You.

A. Problem Description and Resolution (20 points)

1. Comment on the adequacy of the problem description, background information, knowledge of available literature/data sources, and anticipated benefits.

The authors do an adequate job of describing the lack of information relating to lower level trophic energy transfer in SAV systems and provide considerable background information through their literature cited.

2. Describe your views on the conceptual approach to solve the problem.

Quantitatively measuring energy transfer in SAV systems would provide important information to environmental mangers. Studying this idea has been a difficult proposition due to the mobile nature of animals utilizing this habitat. Using stable isotope analyses to pinpoint sources of nutrition helps to address this issue.

SCORE (Circle one)	Poor				Excellent
	0	5	10	(15)	20

B. Soundness of Project Design/Technical Approach (25 points)

1. Is there sufficient information to technically evaluate the proposal?

Methods described by the authors were adequate and well documented with literature for sampling SAV biomass, lower trophic level, and higher trophic level fauna. There was no timeline for sampling or dissemination of products.

2. What are the strengths/weaknesses of the project design (thoroughness, practicality, methods, integration with other work, etc.)?

The measurement of transient fish predators using a trammel net quantitatively is one of the better methods of measuring these highly mobile animals. Measuring the gut contents for stable isotope would provide additional evidence as to the importance of SAV to the life histories of finfish.

There was no mention of measuring natural variability in the ecosystems for a power analysis to determine sample size. Sample sizes may be too small, for lower trophic level fauna. Authors do not include benthic infauna in their list of lower trophic level fauna to be studied. They should provide reasoning why they were not included when they are known to be important food sources for fish such as croaker and spot.

SCORE (Circle One)	Poor					Excellent
	0	5	10	(15)	20	25

C. Project Management and Experience/Qualifications of Personnel (15 points)

What is your opinion of the experience and capabilities of the Principal Investigator(s) to manage and conduct the work, the availability of facilities, and education and experience of assisting personnel.

SCORE (Circle one)	Poor			Excellent
	0	5	10	(15)

D. Project costs (15 points)

Is the budget realistic and reasonable? Indicate any unreasonable costs.

The budget is appropriate for one year of field work

SCORE (circle One)	Poor			Excellent
	0	5	(10)	15

E. Value of the Project to Fisheries Managers (25 points)

Do you believe the results of this project will further management of the species described? Will the results be useful to managers?

This data will provide some information to fisheries mangers who are employing an ecosystem based approach to fisheries management. However, due to the current limitations of these types of models their current value to fisheries managers is resticted.

SCORE (circle one)	Poor					Excellent
	0	(5)	10	15	20	25

PLEASE ADD ANY FURTHER COMMENTS ON THE PROPOSALS BELOW:

The scope of work described in the proposal is too esoteric for the purpose of the funding group. Their mission is to fund projects which improve recreational fisheries and this proposal does not meet that criteria. While the ecological function of SAV is important to the life history of recreationally important finfish, understanding the energy transfer from lower trophic levels to higher trophic levels would be more useful for community ecological modeling than of a direct benefit to RFAB.